

REMARKS

Reconsideration of the pending application is respectfully requested on the basis of the following particulars:

Claim objections

Claim 3 is presently objected to for certain informalities. In particular, the examiner notes that the phrase "JEEG codec" should be "JPEG codec." Claim 3 has been amended according to the examiner's suggestion. Accordingly, withdrawal of the objection is requested.

Rejection of claims 1-10 under 35 U.S.C. § 103(a)

Claims 1-10 presently stand rejected as being unpatentable over Kim (U.S. 2003/0179939) in view of Lim (U.S. 2004/0204144) and further in view of Tang et al. (U.S. 2004/0061902). This rejection is respectfully traversed for at least the following reasons.

Claim 1 is amended to more clearly describe the present invention, by incorporating features previously set forth in claim 9. Claim 9 is cancelled, accordingly.

Amended claim 1 provides that the baseband processor directly displays an image, which exists in the mobile phone, on the LCD module through the image controller, without activating the color interpolation device, the RGB-to-YUV converter and the compression engine of the image controller and the sensing module.

It is respectfully submitted that the cited references, whether considered individually or in any combination, fail to disclose or suggest the invention set forth in claim 1 wherein the baseband processor directly displays an image, which exists in the mobile phone, on the LCD module through the image controller, without activating the color interpolation device, the RGB-to-YUV converter and the compression engine of the image controller and the sensing module.

According to the present invention, a lens and sensor are configured in a sensing module, while the color interpolation device, RGB-to-YUV converter, and compression engine are configured in the image controller. In such a configuration, since the image controller includes the color interpolation device and the RGB-to-YUV converter typically provided by a camera module, the camera module is simplified to include only the sensing module having the lens and the sensor. Thus, defects caused by prior camera modules are prevented (see the Description of Related Art of in the present application).

Further, the RGB image signal with complete color information can be stored directly in the buffer and immediately output to the LCD module through the image interface, for displaying without performing any conversion.

Moreover, because the lens and the sensor are located in the image sensing module, while the color interpolation device, the RGB-to-YUV converter, and the compression engine are packed in the image controller, the baseband processor is allowed to directly display in image existing in a mobile phone through the image controller without activating the color interpolation device, the RGB-to-YUV converter, and the compression engine of the image controller and the sensing module, thereby achieving a feed-through operation mode for saving power.

However, the cited references employ a conventional camera module, wherein conversion between RGB and YUV signals and associated interpolation are repeated for further image processing or display, since such a camera module inputs an RGB image signal and outputs a YUV image signal while an image display typically displays an RGB image signal. (see Kim [0038], [0041], Fig. 2; Lim [0040], Figs. 5-7; Tang [0039]-[0040], Fig. 6A).

Accordingly, the references, even in combination, don't disclose or suggest each and every element of the invention set forth in amended claim 1.

Because the cited references fail to disclose or suggest each and every element of the invention set forth in amended claim 1, it is respectfully submitted that these references fail to form a prima facie case of obviousness of claim 1, and therefore claim 1,

Application No.: 10/811,861
Responsive to Official Action of June 4, 2007
Examiner: A.H. Cutler
Art Unit: 2622

along with claims 2-8 and 10 which depend from claim 1, are allowable over the cited references. Accordingly, withdrawal of the rejection is respectfully requested.

Conclusion


In view of the amendments to the claims, and in further view of the foregoing remarks, it is respectfully submitted that the application is in condition for allowance. Accordingly, it is requested that claims 1-8 and 10 be allowed and the application be passed to issue.

If any issues remain that may be resolved by a telephone or facsimile communication with the Applicant's attorney, the Examiner is invited to contact the undersigned at the numbers shown.

BACON & THOMAS, PLLC
625 Slaters Lane, Fourth Floor
Alexandria, Virginia 22314-1176
Phone: (703) 683-0500

Date: September 4, 2007

Respectfully submitted,


JOHN R. SCHAEFER
Attorney for Applicant
Registration No. 47,921